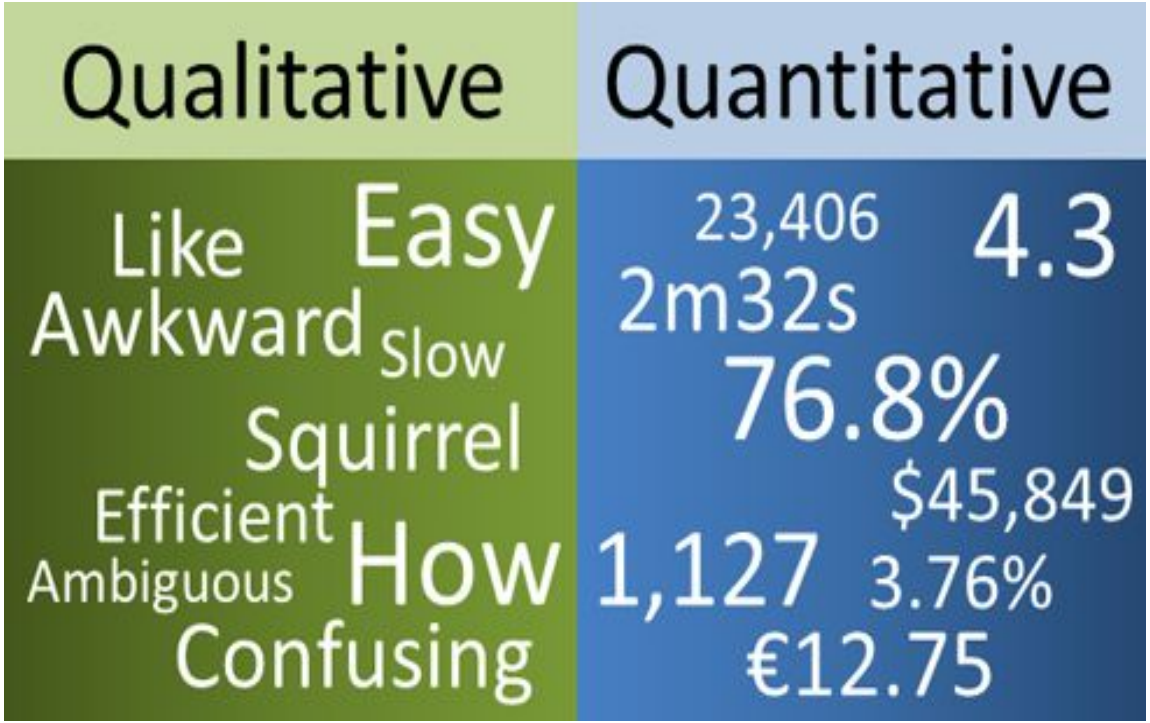
Plan for the week

- M: Introduction to Spreadsheets
- W: Descriptive statistics
  - Measures of central tendency
- F: Section
  - More advanced spreadsheet functionality (sort, filter, pivot tables, etc.)

Qualitative vs. Quantitative Data

Data can be either qualitative or quantitative



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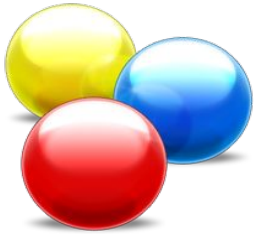
Qualitative data



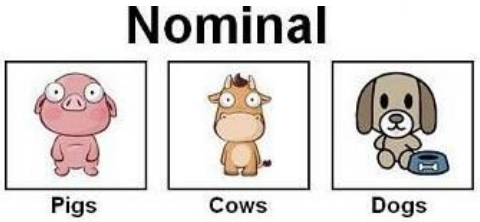
Qualitative data describe qualities, like color, texture, smell, taste, appearance, etc.

Many qualitative data are categorical: e.g.,

- the color of a ball (yellow, blue, or red)
- the brand of a product purchased (brand A, B, or C)
- whether a person is employed (yes or no)

Qualitative data can be nominal or ordinal

- Nominal means that there is no natural order among the values



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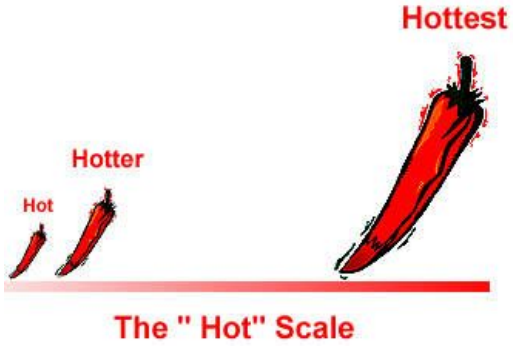
- Ordinal means that there is a natural ordering



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Quantitative data

Quantitative data take on numerical values, so are typically ordinal

Examples:

- age, weight, height, income, etc.
- the value of a country's exports
- a batter's number of home runs

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Quantitative data can be either discrete or continuous

- Data are discrete if the measurements are necessarily integral (i.e., integers)

- Data are continuous if the measurements can take on any value, usually within some range

Likert Scale

- A range of satisfaction scores
- Used to measure a range of attitudes (not just the binary)
- A way to to convert qualitative data to quantitative

E.g., How satisfied are you with this course?